

the anode and cathode assemblies forming a unidirectional electrode winding having the anode current collector located only in one or more outer layers of the electrode winding [having two substantially straight sides, the second height of the anode current collector being shorter than the third height of the cathode current collector].

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62. (Once Amended) The electrode assembly of claim 55, wherein the elongated alkali metal has a first height, wherein the cathode current collector has a third height, and wherein the first height is about 90%, about 80%, about 70%, about 60%, about 50%, about 40%, about 30%. about 20%, about 15%, about 10%, or about 5% shorter than the third height.

Remarks

In the Final Rejection mailed 10/30/00 ("Final Rejection"), Claims 1-8, 10-17, 28-35, 37-44, 46-53, 55-62, 64-71, 73-80, 82-89, and 91 were pending. Claims 1-8, 10-17, 28-35, 37-44, 46-53, 55-62, 64-71, 73-80, 82-89, and 91 were finally rejected based on the prior art cited in the Final Rejection.

In response to the Final Rejection, the foregoing Amendment to the claims is filed along with the filing of a Continuation Application filed under 37 CFR 1.53(d) in the subject application. In the Amendment filed herewith, Claims 1, 10, 28, 37, 46, 55, and 62 are amendment. Claims 64-71, 73-80, 82-89, and 91 are canceled without prejudice, and Claims 2-8, 11-17, 27-35, 38-44, 47-53, and 56-61 remain unchanged. It is respectfully submitted that in view of the amendments presented above and the arguments set forth below, Claims 1-8, 10-17, 28-35, 37-44, 46-53, and 55-62, as presently presented, are allowable over the prior art cited in the Final Rejection. An early Notice of Allowance in this case is therefore respectfully requested.

Arguments

1. In the Final Rejection, Claims 1-8, 10-17, and 37-44 were rejected under 35 USC §103(a) as being unpatentable over Takeuchi et al ("Takeuchi") in view of Kelm. The Claims have been amended to include aspects of Applicants' invention not taught or suggested by either Takeuchi or Kelm, alone or in combination, and the Claims are

therefore allowable over that rejection.

Claim 1 has been amended to include the aspect of Applicants' invention whereby the unidirectional electrode winding is wound so that the anode current collector is located on one or more outer layers of the electrode winding. (Last Clause of Claim 1.) This Claim further describes a current collector having a length that is shorter than the length of the alkali metal forming the anode. (Claim 1 lines 7-9.) For example, these aspects of Applicants' invention are described in Applicants' Specification on page 13 lines 6-8, page 17 lines 11-13, and page 27 lines 11-13, and as shown in at least Figures 24A. Page 27 describes this aspect as follows:

"...corresponding ends of first and second portions of lithium were aligned and then embedded in shortened current collector 5 of Figure 24A such that shortened current collector 5 was disposed in only that portion of anode assembly 1 forming the outer wrap or outer layer in a spirally wound cell."

The above-cited passage discusses the use of a *shortened anode current collector* that is positioned only at the *outer layers* of the spirally wound cell, as claimed by amended Claim 1. Some of the advantages of this arrangement are discussed on page 33 line 18 through page 34 line 3, including the advantage that by having the shortened anode current collector only on the outer windings, more active material, either anodic or cathodic, may be included in the cell having a same internal volume as prior art cells.

In contrast to Applicants' invention of Claim 1, it does not appear that either Takeuchi or Kelm, either alone or in combination, teach or suggest having a spirally wound cell wherein the anode current collector is shorter than the anode, and wherein the outer layers of the spirally wound cell are comprised of the anode current collector. For at least these reasons, Claim 1 is allowable over the rejection set forth in the Final Rejection as presently presented.

Claims 2-8 depend from Claim 1, and are allowable over the art cited in the Final Rejection for at least the reasons set forth with respect to Claim 1.

Independent Claim 10 and Claim 37, as presently presented, include aspects of Applicants' invention that are similar to Claim 1, and are all believed to be allowable for reasons similar to those discussed above with respect to Claim 1. Claims 11-17 and

Claims 38-44 depend from Claims 10 and 37, respectively, and are also believed to allowable for reasons similar to those set forth with respect to the associated independent Claims.

2. In the Final Rejection, Claims 28-35, 82-89 and 91 were rejected under 35 USC §103(a) as being unpatentable over Goebel et al. ("Goebel") in view of Kelm.

Claim 28 has been amended to include aspects of Applicants' invention that are similar to those aspects discussed above with respect to Claim 1, and is believed to be allowable for the reasons set forth above with respect to Claim 1. Claims 29-35 depend from Claim 28, and are allowable over the rejections set forth in the Final Rejection for reasons similar to those related to Claim 28.

Claims 82-89 and Claim 91 have been canceled.

3. Claims 46-53, 55-62, 64-71, and 73-80 were rejected under 35 USC §103(a) as being unpatentable over Takeuchi in view of Kelm, and further in view of Goebel.

In regards to independent Claims 46 and 55, these Claims have been amended to include aspects of Applicants' invention that are similar to those aspects discussed above with respect to Claim 1. These Claims are therefore believed to be allowable for the reasons set forth above with respect to Claim 1. Claims 47-53 and Claims 56-62 depend from Claims 46 and 55, respectively, and are allowable over the rejection set forth in the Final Rejection for reasons similar to those related to the respective independent Claims.

Conclusion

The above amendment is submitted with the filing of a Continuing Prosecution Application in the subject case. In the amendment, Claims 1, 10, 28, 37, 46, 55, and 62 are amendment. Claims 64-71, 73-80, 82-89, and 91 are canceled without prejudice, and Claims 2-8, 11-17, 27-35, 38-44, 47-53, and 56-61 remain unchanged. If the Examiner has questions or comments related to the amendment or arguments presented herein, a call to the number listed below is encouraged and welcomed. It is respectfully submitted that in view of the amendments and the arguments set forth above, Claims 1-8, 10-17, 28-35, 37-44, 46-53, and 55-62 are allowable as presently presented. An early Notice of Allowance in this case is therefore respectfully requested.

Respectfully submitted,

By Applicant's attorneys,

Date: $\frac{1/30/01}{}$

Beth L. McMahon Reg. No. 41,987 MEDTRONIC, INC. 7000 Central Avenue N.E. Minneapolis, Minnesota 55432 (763) 514-3066

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